G2844/G2845
G2844F/G2845F
PREMIX FRYERS

INSTALLATION, SERVICING and USER INSTRUCTIONS

These appliances must be installed and serviced by a qualified person as stipulated by the Gas Safety (Installation & Use) Regulations.

IMPORTANT

The installer must ensure that the installation of the appliance is in conformity with these instructions and National Regulations in force at the time of installation. Particular attention MUST be paid to -

Gas Safety (Installation & Use) Regulations
Health And Safety At Work etc. Act
Local and National Building Regulations
Fire Precautions Act

I.E.E. Regulations for Electrical Installations
Electricity at Work Regulations

Detailed recommendations are contained in **Institute of Gas Engineers** published documents : **IGE/ UP/ 1, IGE/ UP/ 2**, **BS6173** and **BS5440**

These appliances have been CE-marked on the basis of compliance with the Gas Appliance Directive for the Countries, Gas Types and Pressures as stated on the data plate.

WARNING -
TO PREVENT SHOCKS, ALL APPLIANCES, GAS OR ELECTRIC, MUST BE EARTHED.

On completion of the installation, these instructions should be left with the Engineer-in-Charge for reference during servicing. Further to this, the user instructions should be handed over to the user, having had a demonstration of the operation and cleaning of the appliance.

PREVENTATIVE MAINTENANCE CONTRACT

In order to obtain maximum performance from this unit we would recommend that a Maintenance Contract be arranged with SERVICELINE. Visits may then be made at agreed intervals to carry out adjustments and repairs. A quotation will be given upon request to the SERVICELINE contact numbers below.

WEEE Directive Registration No. WEE/DC0059TT/PRO
At end of unit life, dispose of appliance and any replacement parts in a safe manner, via a licenced waste handler. Units are designed to be dismantled easily and recycling of all material is encouraged whenever practicable.

This equipment is **ONLY FOR PROFESSIONAL USE**, and shall be operated by **QUALIFIED** persons. It is the responsibility of the supervisor or equivalent to ensure that users wear **SUITABLE PROTECTIVE CLOTHING** and to draw attention to the fact that some parts will, by necessity, become **VERY HOT** and will cause burns if touched accidentally.

Falcon Foodservice Equipment
HEAD OFFICE AND WORKS
Wallace View, Hillfoots Road, Stirling. FK9 5PY. Scotland.
SERVICELINE CONTACT
Phone: 01438 363 000 Fax: 01438 369 900

T100742 Ref. 3

IMPORTANT INFORMATION

Warranty Policy Shortlist

Warranty does not cover :-

- Correcting faults caused by incorrect installation of a product.
- Where an engineer cannot gain access to a site or a product.
- Repeat commission visits.
- Replacement of any parts where damage has been caused by misuse.
- Engineer waiting time will be chargeable.
- Routine maintenance and cleaning.
- Gas conversions i.e. Natural to Propane gas.
- Descaling of water products and cleaning of water sensors where softeners/ conditioners are not fitted, or are fitted and not maintained.
- Blocked drains
- Independent steam generation systems.
- Gas, water and electrical supply external to unit.
- Light bulbs
- Re-installing vacuum in kettle jackets.
- Replacement of grill burner ceramics when damage has been clearly caused by misuse.
- Where an engineer finds no fault with a product that has been reported faulty.
- Re-setting or adjustment of thermostats when unit is operating to specification.
- Cleaning and unblocking of fryer filter systems due to customer misuse.
- Lubrication and adjustment of door catches.
- Cleaning and Maintenance
    - Cleaning of burner jets
    - Poor combustion caused by lack of cleaning
    - Lubrication of moving parts
    - Lubrication of gas cocks
    - Cleaning/adjustment of pilots
    - Correction of gas pressure to appliance.
    - Renewing of electric cable ends.
    - Replacement of fuses
    - Corrosion caused by use of chemical cleaners.

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SECTION 1 - INSTALLATION

UNLESS OTHERWISE STATED, PARTS WHICH HAVE BEEN PROTECTED BY THE MANUFACTURER ARE NOT TO BE ADJUSTED BY THE INSTALLER.

Please ensure that any plastic coatings are removed prior to use. Before operation, pan requires to be thoroughly cleaned and dried.

Discolouration of heated parts is caused by factory testing to ensure a satisfactory unit. It does not affect quality or performance.

1.1 MODEL NUMBERS, NETT WEIGHTS and DIMENSIONS

Model	Width *(mm)*	Depth *(mm)*	Height *(mm)*	Weight *(kg)*
G2844 Fryer G2844F Fryer	400	840	1200	94
G2845 Fryer G2845F Fryer	400	840	1200	94

Pan oil capacity: 16 litres cold, good quality oil *(to -MIN- mark)*

1.2 SITING

Each unit must be installed on a firm level floor in a well-lit draught free position. The fryer should be installed in a freestanding position to prevent any possibility of sideways tipping under force. The means of restraint may be the manner of installation, such as connection to a battery of appliances or installing the fryer in an alcove, or by separate means, such as adequate ties.

1.2.1 Anti-tipping Accessory

An anti-tipping mechanism is also available as an accessory. If these are to be fitted, the brackets must be fitted to locate the fryer in the correct position relative to any walls as detailed below. Fixing holes are provided in the fryer base to accommodate the bracket. The bracket should be fitted as detailed in Figure 1. The retaining chain has a quick release eyelet. Secure to fixing point and secure bracket to floor after alignment with anti-tipping device attached to the fryer. Adjust to slide below floor bracket.

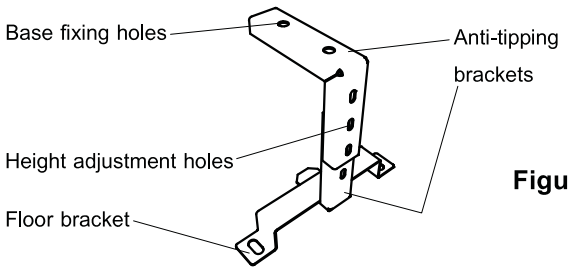


Figure 1

Figure 1 - Anti-tipping Bracket

1.2.2 Clearances

The unit requires a clearance of at least 150mm to rear between unit and any combustible wall.

A minimum vertical clearance of 750mm should be allowed between top edge of flue outlet and any overlying combustible surface.

Important

If fryer is to be installed with other appliances then instructions for every model should be consulted to determine necessary clearance to any combustible wall or overlying surface.

Some appliances require greater clearance distances than others. The largest clearance will therefore determine overall distance for a complete suite of adjoining appliances.

1.3 VENTILATION

The appliance ventilation requirements should be in line with national and local regulations.

The ventilation rate for these models is 26m³/min.

The appliance flue discharges vertically from top of unit. There must be no direct connection of flue to any mechanical extraction system or outside air. The fryer should be installed under a ventilated canopy.

Adequate ventilation, whether natural or mechanical must be provided to ensure sufficient fresh air for combustion and for removal of combustion products which may be harmful to health.

For multiple installations, requirements require to be added together. Installation should be made in accordance with local and/or national regulations applying at the time. A competent engineer must be used for any installation work.

1.4 GAS SUPPLY *(Both models)*

	Inlet pressure
Natural Gas	**20mbar**
Propane Gas	**37mbar**

The incoming service must be of sufficient size to supply full rate without excessive pressure drop. A gas meter is connected to service pipe by gas supplier. Any existing meter should be checked preferably by the gas supplier to ensure that it is adequate to deal with the rate of gas supply required.

Installation pipe work should be fitted in accordance with IGE/UP/2. The size of the pipes from meter to appliance must not be less than that of appliance inlet connection. A ¾" BSP inlet connection is fitted to the unit.

An isolating valve must be located close to the appliance to facilitate shut down during an emergency or routine servicing. The cock must be easily accessible to the user. The installation must be tested for gas tightness as stated in IGE/UP/1.

Domestic type, flexible rubber tube connections must NOT be used with this appliance.

Only tube complying with BS669 Part 2, Specification for corrugated metallic flexible hoses for catering appliances, shall be used.

1.5 ELECTRICAL SUPPLY

The unit is equipped with a 3-core flexible cord with standard 3 pin plug fitted with a 13A fuse. A regular 13A socket outlet can be used.

If supply is through a distribution fuse box, this must be via a fuse with a maximum rating of 13A.

In the event of mains cable being replaced, any new cable should comply with 60245 IEC 57 designation. (H05 RN - F)

	Rated Voltage	Rated Current
G2845	230V~	0.17amps
G2845F	230V~	1.37amps
G2844	230V~	0.17amps
G2844F	230V~	1.37amps

THE APPLIANCE MUST BE EARTH BONDED.

1.6 TOTAL RATED HEAT INPUTS

Natural and Propane Gas
22kW (net) 82,500 btu/h (gross)

Note: F variant has FriFri oil filtration pump fitted.

SECTION 2 - ASSEMBLY and COMMISSIONING

The gas supply piping and connection to appliance must be installed in accordance with the various regulations listed on the cover of this manual.

2.1 ASSEMBLY

a) Unpack appliance
b) Unpack fryer baskets and accessories.
c) Place basket support grid and basket in pan.
d) Level appliance and fit all service protection kits.
(Anti-tilt kit, if ordered as accessory).

2.2 CONNECTION TO A GAS SUPPLY

Connect gas supply and test for gas tightness.

Caution - Ensure that pan contains an acceptable level of liquid before igniting burner.

Due to the presence of mains electrics, integral pipe work should be checked for gas tightness using an appropriate gas leak detector.

Caution - Installation engineers should note that for first time connection of appliance to supply, **it is essential** that inlet gas supply to fryer is completely purged of air prior to first lighting attempt. Otherwise, since this is a light pilot first every time system, it will take a significant number of tries to light due to the small amount of air bled from pipe by pilot at each attempt. This should not initially be treated as a fault.

Please note that several attempts will still be required after air purge to fryer for first time lighting. This is due to capacity of valve and governor.

2.3 CONNECTION TO AN ELECTRICAL SUPPLY

Ensure flexible cable does not come into contact with any hot parts. The fuse rating should be 13A.

The colour coding of power supply cables are as follows:

Live - **Brown**, Neutral - **Blue**, Earth - **Green/Yellow**

2.4 STARTING UP

If you are in the fat melting cycle <<fat melting cycle>> (FMC) and loading solid fat for the first time, always remove basket support plate as detailed in Section 9. Solid fat should be in direct contact with fryer pan.

Refer to Section 9.

2.4.1 G2844 and G2844F Fryers Control Panel *(See Figure 2)*

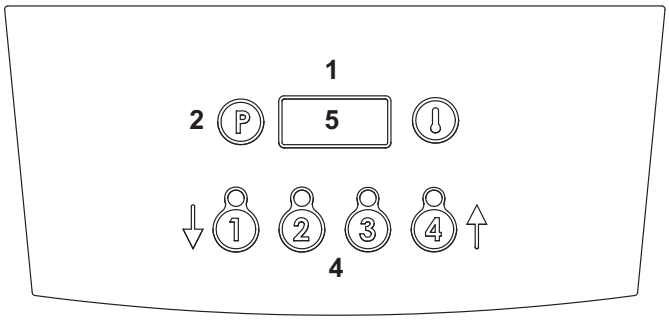


Figure 2 – G2844/2844F Control Panel

1. Four Digit LED Display

Displays Set temp, Actual temp, cook time remaining and also used for programming purposes.

2. Program Button

Used to enter timer programme mode *(to change each of the 4 pre-set timer select channels - See Section 6).*

3. Temperature Button

Used to view Actual/Set temperature and also to enter Set temperature mode *(See Section 6).*

4. Timer Keys (1 – 4)

Used to start/cancel pre set cook times. Buttons 1 & 4 also used to change times or temperatures when in either set mode *(See Section 6).*

5. Heat demand LED indicator

Illuminates when thermostat demands heat, i.e. oil is more than 2ºC below programmed set temperature. Will extinguish when desired setting is reached.

2.4.3 G2844/G2845/G2844F/G2845F - Additional Controls *(See Figure 4)*

The following additional controls are located behind cabinet door.

1. Burner and Temperature Controls ON/OFF Switch

Cuts power to burner and temperature controls.

2. Burner Lockout Indicator

Indicates flame failure.

2.4.2 G2845 and G2845F Fryer Control Panel *(See Figure 3)*

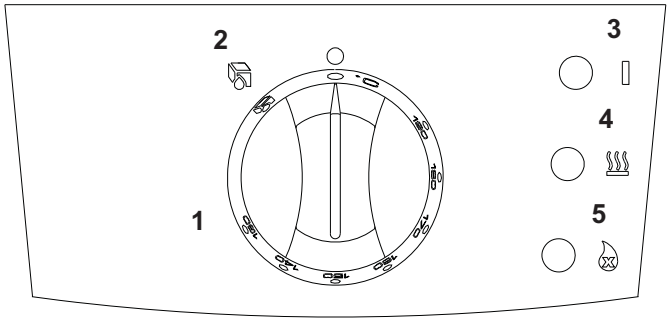


Figure 3 – G2845/2845F Control Panel

1. ON/OFF and Temperature Control Knob

Temperature Selection *(140 - 190°C). (Unit is off when in position indicated).*

2. Fat Melt Position

Feature for slow pulsed heating of solid fats.

3. Power on indicator.

4. Heat Demand Indicator

Illuminates when thermostat demands heat, i.e. oil temperature is more than 5ºC below temperature setting. Extinguishes when desired temperature is reached.

3. Burner Lock-Out Indicator

Indicates flame failure *(burner is not lit).*

4. Filtration Pump Switch *(2845F only)*

Energises filtration pump when burner switch is in OFF (O) position.

5. Temperature Safety Limiter Reset Button

Inside red recess.

Key to Controls

A. Drain handle
B. Access plate
C. Temperature limit thermostat
D. Burner switch
E. Burner lockout reset switch
F. Burner lockout reset switch and indicator *(G2844/2844F only)*
G. Filtration pump switch
H. Temperature safety limiter reset switch *(inside red recess)*

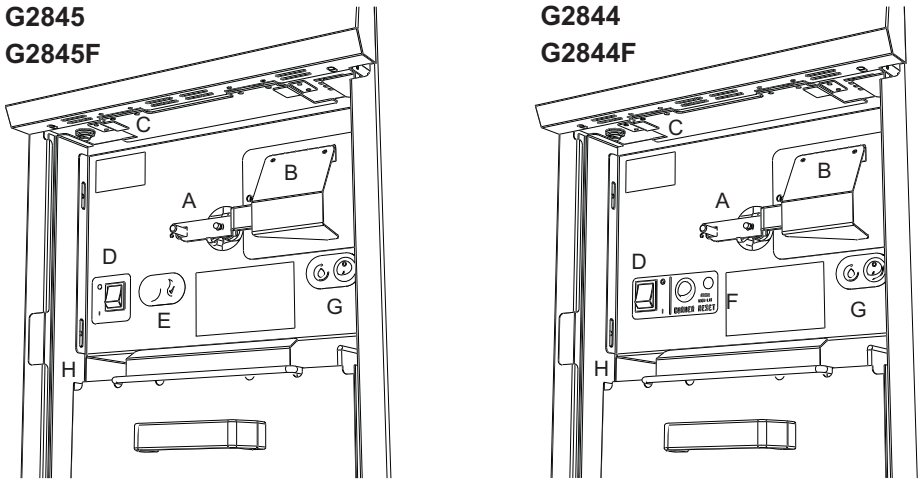


Figure 4 – G2844 & G2845 - Additional Controls

2.5 PRE-COMMISSIONING CHECK

1. Clean out pan thoroughly using hot water and detergent. Rinse out and dry thoroughly.

Note
For further detail with regard to cleaning, refer to Section 8.

2. Ensure drain valve is closed. Fill pan with clean cooking oil to - C - *(maximum cold fill mark)* indicated on basket hanging rail. *(See Figure 6)* **Note**: H refers to maximum hot fill mark.
3. With gas supply still shut off, turn on electrical mains supply.
4. Open door and press temperature limit thermostat reset button *(red)*, refer to Section 2.6. Set burner switch to Position 'I' *(ON position)*.
5. Turn control knob to desired temperature *(140ºC) (G2845 only)*. Heat demand indicator will illuminate *(Figure 2, item 4).*
6. Fryer premix fan will run and spark ignition may be heard before unit locks out.
7. A neon will illuminate to indicate that lockout hasoccurred and that no burner flame is present.
8. Turn on gas supply.
9. Press lockout reset switch. See Figure 4 *(Lock out indicator will extinguish).*
10. Burner will ignite and heat indicator will illuminate to signify that burner is on.

Note: If lockout should occur, repeat Steps 10 -11 until air is bled from supply.

12. When burner flame is established, check for gas leaks. Care should be taken because mains voltage is present. Isolate after gas checks.

2.5.1 Checking Controller Operation

To check operation of controls, refer to Using The Controller - Section 6.2.2.

2.5.2 Checking Oil Filtration Pump

To check operation of oil filtration pump, refer to Section 7.

Important
After installation, the responsible technician should check for gas leaks and ensure the appliance is operating safely and satisfactorily before handing over to the user.

2.6 TEMPERATURE LIMIT THERMOSTAT

The unit is equipped with an additional temperature limit thermostat, independent of the main controller.

In the case of operating thermostat failure, allowing oil temperature to rise above predetermined legislation safe zone *(230ºC)*, limit device will activate and cut power to controller. It will also stop the flow of gas to burner.

To re-set temperature limit thermostat, refer to Figure 4.

G2844/2844F and G2845/2845F Models

a) Turn burner and temperature controls ON/OFF switch to OFF position.

b) Allow oil to cool below 180ºC

c) Reset red button on limit thermostat with a pen or similar item. The button is located behind cabinet door at upper RH, below facia panel.

d) Turn burner and temperature controls ON/OFF switch to ON position.

e) Reselect temperature.

f) If limit thermostat reactivates carry out fault finding on temperature control circuitry.

2.7 INSTRUCTION TO USER

After installing and commissioning appliance, please hand Instructions to user or purchaser and ensure that the person*(s)* responsible understands the instructions to correctly operate and clean unit in a safe manner.

Emphasis should be given to safe operation and use of drain valve and oil bucket. Oil bucket should not be overfilled to allow safe movement. Oil should be allowed to cool before any manual handling.

Note: The oil container may be heavy. Drain small amounts at a time if necessary, before lifting container. Manual handling regulations should be observed.

It is important to ensure that location of gas shutoff valve is made known to user and that procedure for operation in an emergency be demonstrated.

SECTION 3 - SERVICING AND CONVERSION

BEFORE ATTEMPTING ANY SERVICING, TURN OFF GAS SHUT-OFF VALVE AND ELECTRICAL SUPPLY. TAKE STEPS TO ENSURE THAT THESE CANNOT BE INADVERTENTLY TURNED ON.

AFTER ANY MAINTENANCE TASK, CHECK UNIT TO ENSURE THAT IT PERFORMS SAFELY AND CORRECTLY AS DESCRIBED IN SECTION 2.5.

ALWAYS CHECK FOR GAS LEAKS.

3.1 GAS CONVERSION

(Natural to propane or propane to natural)
This model is suitable for field conversion.

3.2 INTEGRAL COMPONENTS

The following parts must be checked and serviced regularly:

1. Premix fan - check for dust, grease ingress.
2. Oil ingress to electrical components.
3. Flue for any blockages.
4. Visual inspection of components, gaskets and fryer pan.
5. Temperature limit thermostat calibration.

3.3 ACCESS PROCEDURES

Before removal of any fryer components:

a) Ensure appliance electrical and gas supply has been shut off and cannot be accidentally turned back on.

b) Allow oil to cool before any operation that requires pan to be drained.

c) Only use parts specified by the manufacturer.

d) All components replaced MUST be fully checked after fitting to ensure safe operation.

e) A full pre-commissioning check as detailed in Section 2.5 should be carried out.

3.4 PREMIX FAN
(Preset venturi must not be changed)

a) Remove mains pipework from rear then remove back panel to gain access to fan.

b) Disconnect plug from fan.

c) Remove bolts at flange of pipework.

d) Undo fixing that secures ignition control box to gas valve and remove.

e) Fan and valve assembly may now be lifted clear.

f) Remove fixings that secure fan to valve/venturi system. Replace in reverse order.

g) Check system for gas leaks.

3.5 GAS CONTROL VALVE
(Preset Venturi Must Not Be Changed)

a) Remove premix fan and valve assembly as detailed in **Section 3.4** and lift clear.

b) Remove bolts to disconnect valve from fan assembly.

c) Replace parts in reverse order and check system for gas leaks.

3.6 BURNER

a) Remove both sides and back panel.

b) Split pipework from both fan and burner.

c) Remove igniter/sensor. **Refer to Section 3.9**.

d) Disconnect burner bolts and carefully drop burner.

e) Fit new gasket and replace burner.

f) Reconnect in reverse order.

g) Check gasket connection is sealed where fitted.

h) Check all gas connections for leaks.

3.7 BURNER RESET SWITCH

a) Remove drain handle and front panel fixings .

b) Remove electrical connections and remove switch by squeezing side fixings to push it through aperture.

c) Replace part in reverse order.

3.8 CONTROL BOARD

a) Remove bolts from top and bottom of control panel.

b) Pull control panel forward then drop down.

c) Disconnect electrics and remove fixings enabling controller to be removed.

d) Replace part in reverse order.

3.9 IGNITER/SENSOR

a) Remove side panels and undo connection wires from ignition control box.

b) Undo electrode/igniter nuts from underside of burner.

c) Pull igniter and gasket out of location.

d) Fit new gasket to igniter and replace parts in reverse order. Ensure that a good earth connection is made.

Note: This can be achieved by removing LH side panel only and/or access plate. Refer to Section 2, Figure 4.

3.10 DRAIN VALVE

a) Ensure fry pot is empty. Refer to **Section 8**.

b) Remove nut from handle and lift handle off.

c) Remove front panel fasteners.

d) Disconnect wiring, noting all connections.

e) Remove front panel to access drain valve.

f) Undo drain pipe and using appropriate size of spanner, remove drain valve.

g) Replace in reverse order and check for oil leak.

3.11 FILTRATION PUMP (When Fitted)

a) Remove back panel and remove flexi-hose at filtration pump.

b) Disconnect electrical coupling plug.

c) Undo bolts from below base panel that secure pump bracket to base and lift clear.

d) Disconnect pump from bracket and replace in reverse order.

Note: Check for oil leaks before replacing any panels.

3.12 FILTRATION PUMP PIPEWORK

a) Remove back panel and flue bolts from rear.

b) Undo quick release connection from top of outer flue.

c) Remove flexi-hose at filtration pump.

d) Lift entire flue assembly clear.

e) Replace in reverse order.

f) Check for oil leaks before replacing any panels.

3.13 FAN SPEED BOARD

a) Open control panel as detailed in Section 3.8.

b) Undo electrical connections and pull ignition board gently from fasteners. Carefully replace board in reverse order.

3.14 IGNITION CONTROL BOX

a) Remove LH side panel at rear of side enclosure.

b) Remove fixing from control box lid.

c) Slide control box from pins on valve and pull clear of case.

d) Undo electrical connections.

e) Replace in reverse order & test.

Note: Control is in “lock-out” when new.

3.15 USER/TEMPERATURE LIMIT THERMOSTAT

a) Open and drop control panel. Remove cover box and undo thermostat nuts to remove thermostat.

b) Disconnect thermostat wires.

h) Carefully replace in reverse order. Check for any oil leaks and that thermostat calibration is within specification.

SECTION 4 - SPARES

When ordering spare parts, always quote appliance type and serial number. This information will be found on unit data plate, located inside the fryer door on LH leg support face.

SECTION 5 - TROUBLESHOOTING and CRITICAL DIMENSIONS

5.1 TROUBLESHOOTING

G2845/2845F

PROBLEM - No power.

Action:

1. Check power is being supplied to unit.
2. Check temperature limit thermostat has not tripped (Refer to Section 2.6).

G2844/G2844F

PROBLEM - No power

Cause: Circuit breaker off.
Solution: Check and reset.

Cause: Appliance not plugged in.
Solution: Plug cord in.

Cause: Defective 24V AC transformer.
Solution: Replace transformer and/or controller.

PROBLEM - No sound

Cause: Inoperable speaker.
Solution: Replace controller.

PROBLEM - Button

Cause: Inoperable key.
Solution: Replace controller.

PROBLEM: PROB is displayed.

Cause: Defective temperature probe.
Solution: Replace temperature probe.

Cause: Probe not plugged in.
Solution: Plug probe in.

PROBLEM: Reading Wrong Temperature

Cause: Defective temperature probe.
Solution: Replace temperature probe.

PROBLEM: Not Heating.

Cause: Check gas circuit.
Solution: Replace defective part.

Cause: Defective controller.
Solution: Replace controller.

Condition - The filtration pump *(where fitted)* is not working. *(Refer to Figure 5)*

Action 1 - Burner ON/OFF control must be switched to OFF before pressing filter pump switch.

Action 2 - The oil suction pipe has become blocked. Clean it and dry thoroughly.

Note: This is caused by debris in the bottom of oil bucket. The microfilter and strainer have not been cleaned or have been damaged.

This can cause unfiltered oil to overflow into the bucket.

Action 3 - The pipework has become blocked *(refer to Action 2)* or has been inserted incorrectly into one of the quick release connections.

Action 4 - The oil is too hot. Pump is fitted with a thermal safety device. This must be allowed to cool before pressing reset switch directly below pump on base panel.

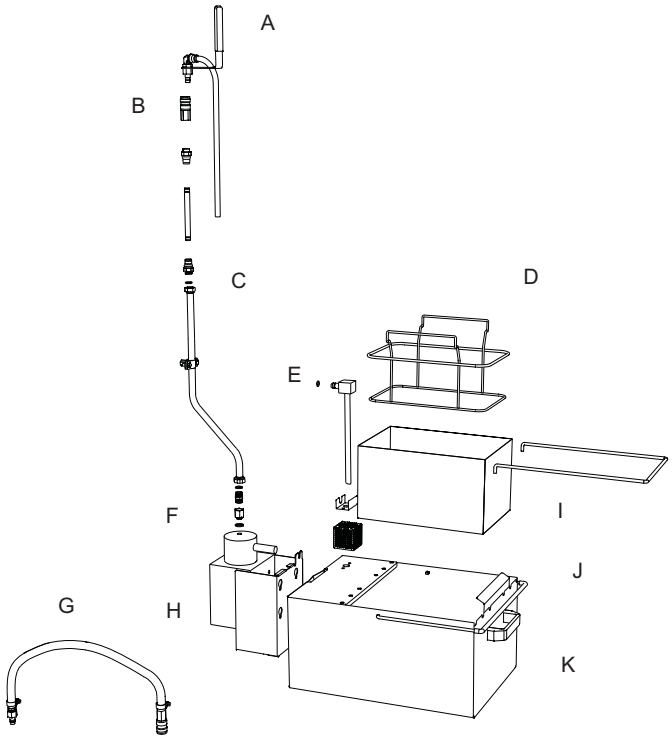
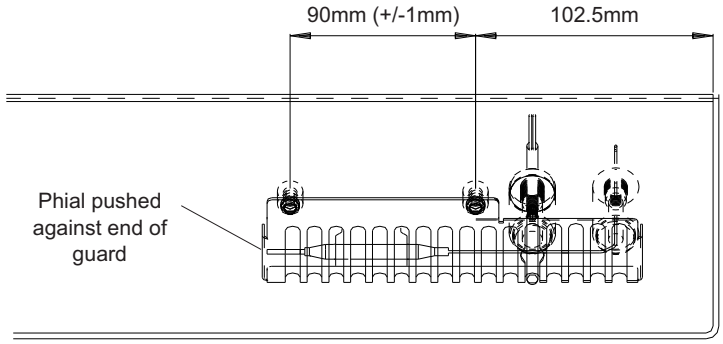


Figure 5

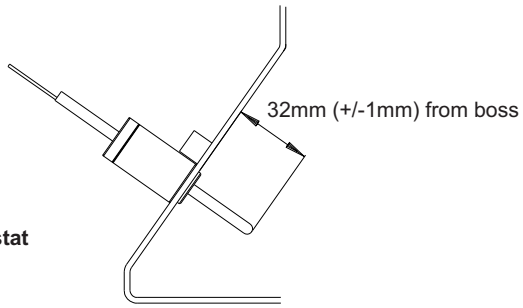
Key to Components

A. Oil return pipe
B. Flue quick release connection
C. Internal filter pipework
D. Strainer basket
E. Suction pipe
F. Oil pump
G. Oil decant hose
H. Pump motor
I. Micro filter
J. Suction pipe filter
K. Oil receptacle

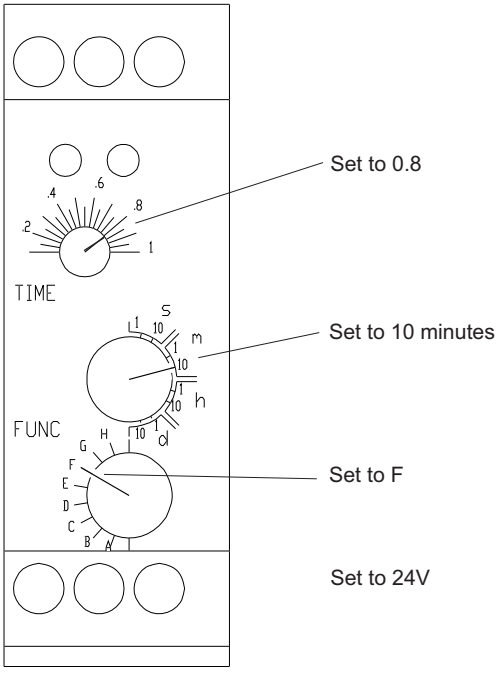
5.1 CRITICAL DIMENSIONS



Safety Thermostat



Operating Thermostat Probe



Oil Pump Timer Settings (G2845F/G2844F only)

SECTION 6 - OPERATING INSTRUCTIONS

The fryers are of single pan type and the following units are covered by this manual.

G2845 - Manual control model.

G2845F - Manual control model with built-in filtration.

G2844 - Four product key electronic control model.

G2844F - Four product key electronic control model with built-in filtration.

USE OF OILS/SHORTENING/SOLIDS *(COOKING MEDIUM)*

These are highly flammable in their liquid state, caution should always be taken when using cooking medium.

Recommendation

PPE *(Personal Protective Equipment)* should be used when cleaning or handling medium within this fryer.

Medium should not be overheated as this will increase the risk of fire.

Note: Fryer is fitted with a thermal safety device. This will stop heating of medium if it becomes overheated.

This appliance will always fail safe.

Note: NEVER leave a working unit unattended.

Medium must always be maintained within fry pot.

Cold Medium - when filling with cold medium *(see Figure 6)*, DO NOT FILL MEDIUM PAST -MIN- LEVEL MARK *(Maximum cold fill mark)* also, for Solid Medium - See Section 10.

-C- Level Mark: Medium should NEVER be allowed to drop below this mark. Should this occur, top up immediately or switch fryer OFF.

Hot Medium and Topping Up Medium

DO NOT FILL MEDIUM PAST -MAX- LEVEL MARK *(Maximum Hot Fill Mark). (See Figure 6)*.

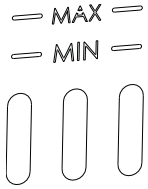


Figure 6

CAUTION: SUITABLE PROTECTIVE CLOTHING MUST BE WORN when topping up whilst fat in fryer is hot.

Medium and Foodstuffs

As foodstuffs increase volume during cooking - follow these rules:

DO NOT ADD WATER TO FRYING MEDIUM AT ANY TIME!

WARNING

No attempt must be made to operate this appliance during a power supply failure.

Please ensure that any plastic coated items are removed prior to use. Before operation, pan requires to be thoroughly cleaned and dried.

Discolouration of heated parts is caused by factory testing to ensure unit is satisfactory. It will not affect quality or performance.

All Models

A neon indicator is incorporated to indicate flame failure when illuminated.

An electronic thermostat with temperature probe is fitted. The operating thermostat automatically controls oil temperature. The temperature limit thermostat ensures that the oil will not reach a dangerous temperature level.

If limit thermostat should activate during operation, an investigation to determine the reason must be carried out by a qualified technician.

Burner is protected by an electronic flame sensor device.

6.1 APPLIANCE CONTROLS

Refer to Sections 2.4.1 and 2.4.2 for control layout.

6.2 LIGHTING and OPERATION

Safety Precautions

The installer must fit a gas shut-off valve in gas pipe that supplies the unit.

The user MUST be familiar with the location and operation of the valve for shutting off gas in event of an emergency.

IF A SMELL OF GAS IS EVIDENT:

a) TURN OFF GAS SUPPLY.

b) VENTILATE AREA.

c) CALL YOUR LOCAL GAS SUPPLIER.

NEVER USE AN OPEN FLAME TO CHECK FOR GAS LEAKS!

6.2.1 Lighting Instructions

Remove lid *(if fitted)* and baskets and set these aside. Ensure fryer pan is clean and completely dry. Ensure also that drain valve is closed. Pour clean, cold oil to -MIN- pan level mark on basket hanging rail.

G2845/2845F Models Only

a) Ensure pan is filled with solid/shortening to indicated level and gas supply is established.
b) Ensure burner switch is in off position *(O)*.
c) Press burner switch to on position *(1)*.
d) Turn knob to select temperature.
(If solid fat is used - Select FMC fat melt cycle)

Warning:
Do not select any setting other than FMC when using solid fats as this will trip safety thermostat or in the worst case scenario, ignite liquefied oils.

e) Heat on indicator will illuminate.
f) If burner fails to light, lock-out indicator will illuminate.
g) Reset burner by turning control knob to off position. Press lock-out switch and wait 30 seconds then repeat from Step d).
h) If burner repeatedly fails to light, switch off electrical and gas supplies. Call service engineer.

G2844/2844F models only

a) Ensure pan is filled with solid/shortening to indicated level and gas supply is established.
b) Ensure burner switch is in off position *(O)*.
c) Press burner switch to on position *(1)*.
d) **G2844** - Factory preset for a temperature of 180ºC *(See Section 6.3 for instructions for change set temp)*.
e) Display will illuminate with figures **8888** for 2 secs, **CTT** for 2 secs, **r 06** for 2 secs and then displays **Louu**. Heat demand LED indicator will illuminate.
f) If burner fails to light, lockout reset indicator will illuminate.
g) Wait 30 seconds and reset burner by pressing lock-out reset switch.
h) If burner repeatedly fails to light, switch off electrical and gas supplies and call a service engineer.

6.2.2 Using the Controller

G2845/2845F Models Only - Manually Operated

When unit has been lit as above, fryer may be operated as following:

a) If using solid fat, turn control knob clockwise to select FMC (Fat Melt Cycle).
b) When solid/shortening has liquified, select desired temperature.

Warning: Do not select any setting other than FMC when using solid fats as this will trip safety thermostat or in worst case scenario, ignite liquefied oils.

c) Fat or oil temperature will then be governed by controller to desired set temperature, selected by user.

G2844/2844F Models only – Programmable

When unit is lit as detailed in Section 6.2.1 lighting instructions above, fryer may be operated as follows:-

NOTES:

1) There is NO solid fat melt pulsing cycle *(FMC)* incorporated in this controller.

2) The oil temperature will be governed by controller at a factory preset temperature of 180ºC. See Section 6.3 for instructions on how to change set temperature.

3) When actual temperature is within 10ºC of set point the display reads **redy**. See Section 6.3 for instructions on how to display actual or set temperature).

4) Before carrying out any cooking operations, controller should be set up for particular application of use *(e.g. up to four timer programmes, product frying temperature, ºC/ºF)*. This can all be carried out using the following guide in Section 6.3.

Operating the Controller:

a) **Start a timing cycle**: Press any product key *(1 to 4)* to start a timing cycle. If key is programmed, the correct time will be displayed and will immediately start to count down and LED above key will flash. DONE will display when cook cycle has ended and alarm will sound. If DONE is displayed immediately and alarm sounds, the key has not been programmed See Section 6.3 for programming details.

b) **Stop a timing cycle**: Press and hold an active product key for 3 seconds, or press key 3 times within 2 seconds.

c) Respond to a **DONE** alarm: Cancel signal by pressing same product key used to start timing cycle.

d) **Multiple timing cycles**: If a second or third product key is pressed while the first is still active, the shortest time remaining key is displayed and only the LED above key flashes, the other*(s)* remain constantly lit. Once shortest time programme ends and is accepted, next shortest is displayed and LED above flashes. **Note**: All product key timers will count down although not displayed until shorter one ends.

e) **Action Alarms** *(Shake, etc.)*: If control is programmed for action alarm, they will signal at a preset time during the timing cycle. The signal, a dual-rhythm beeping, will last 5 seconds and then self-cancel. The display will flash action alarm time and then will continue counting towards **0:00**.

f) **Viewing Actual/Set Temperatures**: Pressing the temperature key once will display ***"AXXX"*** where XXX is actual temperature in degrees *(C or F depending on how controller is programmed – See Section 6.3).* Pressing the temperature key again within 5 seconds will display ***"PXXX"*** where XXX is the programmed Set temperature of the controller in degrees *(C or F depending on how controller is programmed – See Section 6.3)*. If temperature key is not pressed again within 5 seconds, display returns to idle or timer mode.

6.3 PROGRAMMING THE G2844/2844F

Display Descriptions

Louu

Controller is in operating mode. Actual vat temperature is more than 10° below programmed vat temperature.

rEdy

Controller is in operating mode. Actual vat temperature is within proper cooking temperature range. The vat is ready to start a cook cycle.

HI

Controller is in operating mode. Actual vat temperature is more than 30° above highest programmed vat temperature.

Prob

Control probe is either open circuited or short circuited. Display will be accompanied by an audible alarm if shorted. Check or replace probe.

2:30

The control is in operating mode and a cook cycle is in progress.

done

The control is in operating mode and a cook cycle has been completed. Display will be accompanied by a pulsing audible alarm.

6.3.1 Programming temperature set point and temperature scale. *(Factory set for 180ºC, range available is 30ºC to 190ºC)*

a) Press and hold temperature key for 3 seconds. ***"Prog"*** will be displayed. Then press **DOWN** *(key 1)* or **UP** *(key 4)* key.

b) The display will show either *"ºC"* or *"ºF" (degrees celsius or degrees fahrenheit)*. Once desired temperature scale is displayed, press temperature key to accept/enter.

c) Display will now alternate between ***"Sett"*** and ***"XXXZ"*** *(where X denotes temperature and Z indicates temperature scale)*.

d) Adjust temperature using **DOWN** *(key 1)* and **UP** *(key 4)* keys. The longer key is pressed, the faster temperature scrolls.

e) When desired temperature has been reached, press temperature key to accept/enter.

f) To exit temperature programming, press temperature key again.

6.3.2 Programming a Product Cycle Time and Action Alarm

a) Press and hold **P** key for 3 seconds. ***"Prog"*** will be displayed. **Note**: Programming mode will exit automatically if no keys are pressed within 2 minutes.

b) Select a product key to program *(1 to 4)*. The display will alternate between ***"ti-z"*** and ***"X:XX"*** where **z** is the number of the key pressed and **X:XX** is the set time in minutes and seconds.

c) Adjust the time up or down using the **DOWN** *(key 1)* and the UP *(key4)* keys. The longer key is held, the faster the time will scroll.

d) Once desired time is reached, press **P** key to accept/enter.

e) The display will now alternate between ***"PrEz"*** and ***"X:XX"*** where **z** is the number of the key pressed and **X:XX** is action alarm time in minutes and seconds.

NOTE: The time entered here is the time action is required before the end of the total cycle time entered above. If NO Action time is required, leave at ***"0:00"***. Adjust time as c) above.

f) Once desired time is reached, press **P** key to accept/enter.

g) ***"Prog"*** will again be displayed and another product key can be selected for programming. Repeat above steps. When no more keys are required to be programmed and ***"Prog"*** is displayed, press **P** key to exit programming mode and return to idle mode.

SECTION 7 - CHANGING/FILTERING THE OIL

Warning

After filtering, wait 30 seconds before removing bucket.

It is dangerous to use shortening that is too old. This medium has a reduced flash point temperature and is prone to surge boiling.

Caution

To prevent surge boiling. DO NOT EXCEED recommended loads or charge the pan with over-wet food items. NEVER LEAVE a working appliance unattended.

Warning

When draining solids/shortening, ensure that the oil has time to strain through strainer basket. Heavily unfiltered oil may overflow.

Note

This could cause pump to block over a period of time and is considered as misuse of equipment.

Warning

When pumping solids/shortening back into fryer pan. Ensure all trace of solids/shortening is emptied from receptacle *(bucket)*.

If oil is not emptied on a regular basis or if oil is left in the receptacle, it may solidify and overflow or spill on to the kitchen floor to create a hazard.

7.1 STARTING THE FILTRATION PROCESS

Refer to Figure 5 for details of filtration components.

1. With burner switch in OFF position, allow oil to cool below 170°C *(or if cold, heat to minimum temperature of 60°C).* Open cabinet door and pull filter bucket forward.
2. Ensure bucket is clean and emptied of all solid/shortening and debris. Refer to Section 8 for details of how to clean filter components.
3. Ensure that strainer and microfilter are clean.
4. With strainer and microfilter in position, slide bucket back on to runner cradle and back into fryer.

Please Note - **Warning**: Do not handle filter components or adjacent surfaces when pump is operating.

Components will remain hot for a period after filter. Allow cooling. Use of PPE's is recommended.

Note: Burner and temperature controls ON/OFF switch must be in OFF position before operation of filter pump can begin.

7.2 G2845F and G2844F MODELS

1. Press filtration pump switch to turn on pump.

Note: With cabinet door open, switch is located at RH side of drain valve *(Refer to Figure 4)*.

2. Turn drain handle clockwise.
3. Pan will drain through strainer basket and microfilter into bucket and will pump back into pan.
4. Clear debris from pan.
5. If pan drain becomes blocked, clear using drain prod.
6. When debris has been removed from pan, turn valve handle anti-clockwise to close valve.
7. Allow pan to refill.
8. If any solid/shortening remains, repeat Step 1.

Warning

Ensure all shortening has been pumped from receptacle before topping up pan.

9. Switch filtration pump off.
10. Top up fryer if required.

7.3 REMOVAL OF SPOILED/USED OIL

This can be easily removed into a transport container or a special barrel for used oil.

Warning

Removal of fryer oil must be carried out under controlled circumstances. Refer to Heath and Safety, Manhandling and Local Dispensing of Oil regulations.

Note: Burner switch must be switched OFF before operation of filtration pump can begin.

1. Press filtration pump switch to turn pump on. Refer to Section 2 *(Figure 4)* for location details.
2. Slide drain locking pin to left before turning drain handle clockwise.
3. Pan will drain through strainer basket into receptacle and pump back into pan through filter suction plate and microfilter.
4. Clear debris from pan.
5. If pan drain becomes blocked, clear using drain prod.
6. When debris has been removed from pan, turn valve handle anti-clockwise to close valve.
7. Press filtration pump switch to switch pump off.
8. Allow remaining oil in pan to drip into receptacle.
9. Turn drain handle anti-clockwise to close valve.

7.3.1 Manual Removal of Oil from Receptacle

1. Slide receptacle forward, using front quick-release connection (See Figure 5). Remove filtration plate.

Note

Using the following procedure, portion oil so that receptacle is not too heavy for an operator to remove. This practice should be carried out when oil is lukewarm.

2. Using handles provided, lift receptacle clear by pulling up and forward.

Note

Care should be taken not to pull runner cradle out during this operation. Be careful also, not to spill oil.

3. Lift receptacle and dispense according to local regulations.

4. Replace oil filter suction plate.

5. Replace receptacle in reverse order.

Note

Cleaning of filters and receptacle should be carried out on a regular basis as required.

7.3..2 Using Oil Decanting Hose

(Refer to Figure 5)

Warning

The decanting hose must ONLY be used to decant oil from unit receptacle to recommended disposal vessel. Always wear the recommended Personal Protective Equipment *(PPE)* to prevent injury as the hose and components will be HOT.

DANGER

NEVER operate decanting hose for purposes other than recommended.

With pump OFF and frypot empty:

a) Disconnect oil return pipe from flue quick-release connection.

b) Connect decanting hose to flue quick-release connection and connect oil return pipe to other end of hose.

c) Using handle, point hose into disposal vessel.

d) Press filtration pump switch to switch pump on.

e) When oil has decanted, press filtration pump switch to switch pump off.

f) When cooled to touch temperature, disconnect oil evacuation hose from flue quick-release.

g) Reconnect oil return pipe to quick release connection.

SECTION 8 -
CLEANING and MAINTENANCE

RECOMMENDATION

Personal protective equipment *(PPE's)* should be used when cleaning or handling medium within this appliance.

WARNING - NEVER PUMP WATER THROUGH THE FILTRATION PUMP AT ANY TIME!

Warning

The fryer is supplied with castors at rear and should be connected to supply piping by means of a connector for moveable appliances. An anti-tipping restraint can be attached to unit and, if so, this must be disconnected before fryer is moved. Ensure restraint is re-connected when unit is returned to original position.

Moving the fryer with hot or cold oil in fry pot can be dangerous to the operator. Scalding could occur. Spilled oil or fat on the kitchen floor could cause slipping accidents and any such deposit should be cleaned up straight away.

To prevent any such hazard, DO NOT move fryer until all liquid has been drained from fry pot.

The following procedure should be undertaken, AT LEAST DAILY.

IMPORTANT: Disconnect electrical supply before any cleaning is undertaken.

Warning

Oil must be allowed to cool to a safe temperature before draining. Do not overfill draining receptacle.

THE APPLIANCE MUST NOT BE CLEANED WITH A JET OF WATER OR BE STEAM CLEANED. DO NOT USE ACID OR HALOGEN-BASED *(e.g. chlorine)* DESCALING LIQUIDS, FLAMMABLE LIQUIDS, CLEANING AIDS OR CLEANING POWDERS.

Stainless Steel Surfaces

It should be noted that certain scouring pads including nylon types, could easily mark stainless steel. Care should be exercised during cleaning process.

When rubbing stainless steel with a cloth, always rub along in grain direction.

8.1 CLEANING THE APPLIANCE

1) Ensure recommendations have been followed.

2) Unit should be switched **OFF** and fry pot drained of oil.

3) Remove baskets, fish plate and crumb catcher. Soak these components in hot soapy water.

4) With drain valve open, remove any traces of debris from fry pot using a clean, damp cloth.

NOTE: Care should be taken not to damage sensors located at pan front.

5) Remove strainer and microfilter, soak these in hot soapy water.

6) Wash, rinse and dry removed items thoroughly. Set these aside.

7) Close drain valve.

8) Fill fry pot 3/4 full with hot water.

9) Clean pan using a soft, clean cloth and hot soapy water, rub away any stubborn staining with a scouring pad and suitable detergent.

10) Open drain valve. Drain water into bucket below.

11) Use clean water to rinse fry pot and dry thoroughly.

12) Close drain valve.

13) Return fish plate and baskets to pan.

14) Remove oil bucket by pulling forward then upward.

15) Use handles and lift oil bucket to sink.

16) Pour away soiled water.

17) Thoroughly wash, rinse and dry oil bucket and oil suction pipe.

18) Replace strainer and micro filter in oil bucket and return oil bucket to cradle.

19) Fill fry pot with clean oil/solid/shortening to -C- mark. To relight, refer to Section 6.2.

SECTION 9 - PREPARATION OF SOLID FATS/SHORTENING

COOKING HINTS

Allow approximately 10 minutes for unit to heat up from cold to required operating temperature.

CHOICE OF FRYING MEDIUM

Select a top quality medium to obtain optimum results. Shortening or solid fats can be used if necessary.

Solid fats MUST be heated carefully as these have a lower smoke point temperature than shortening.

The fryer is equipped with a fat melt cycle that will pulse heat into the fryer.

A quality shortening is a more stable frying medium. It allows longer periods of use without smoking or foaming. It will also give food a better flavour.

Quality shortening has a higher flashpoint temperature and will reduce gumming around the pan.

Regular filtering will help improve lifespan of the medium.

WARNING - NEVER MIX SHORTENING AND SOLID FAT!

Charging The Pan

Prior to operation, clean fry pot out using hot water and detergent. Rinse out and dry thoroughly.

Ensure drain valve is closed. Fill fry pot with cold shortening to -C- level mark on basket hanging rail.

Approximate maximum oil level capacity is 18 litres.

Solid Fat

If solid fat is to be used, remove fish plate and cut fat into small pieces. Place 17kg in fry pot and pack it down. Position fish plate upon top of the fat. Push front end into fat lightly until front edge is below temperature probe. Ensure that FAT MELT CYCLE *(G2845/2845F)* is selected for this process.

Note

Fish plate will lower slowly into fry pot as solid fat melts.

Warning

If fish plate does not sit flat, lift plate from centre slightly and lower carefully to ensure that no splashing of hot shortening occurs.

Check that correct shortening level is achieved when all solid fat has melted. Required temperature may then be set.

Solid fat should always be heated this way to prevent overheating and burning.

WARNING: It is dangerous to use shortening that is too old. Such shortening has a reduced flash point temperature and is prone to surge boiling.

CAUTION: To prevent surge boiling. **DO NOT EXCEED** recommended loads or charge pan with over-wet food items. **NEVER leave a working appliance unattended**.

SECTION 10 - COOKING HINTS

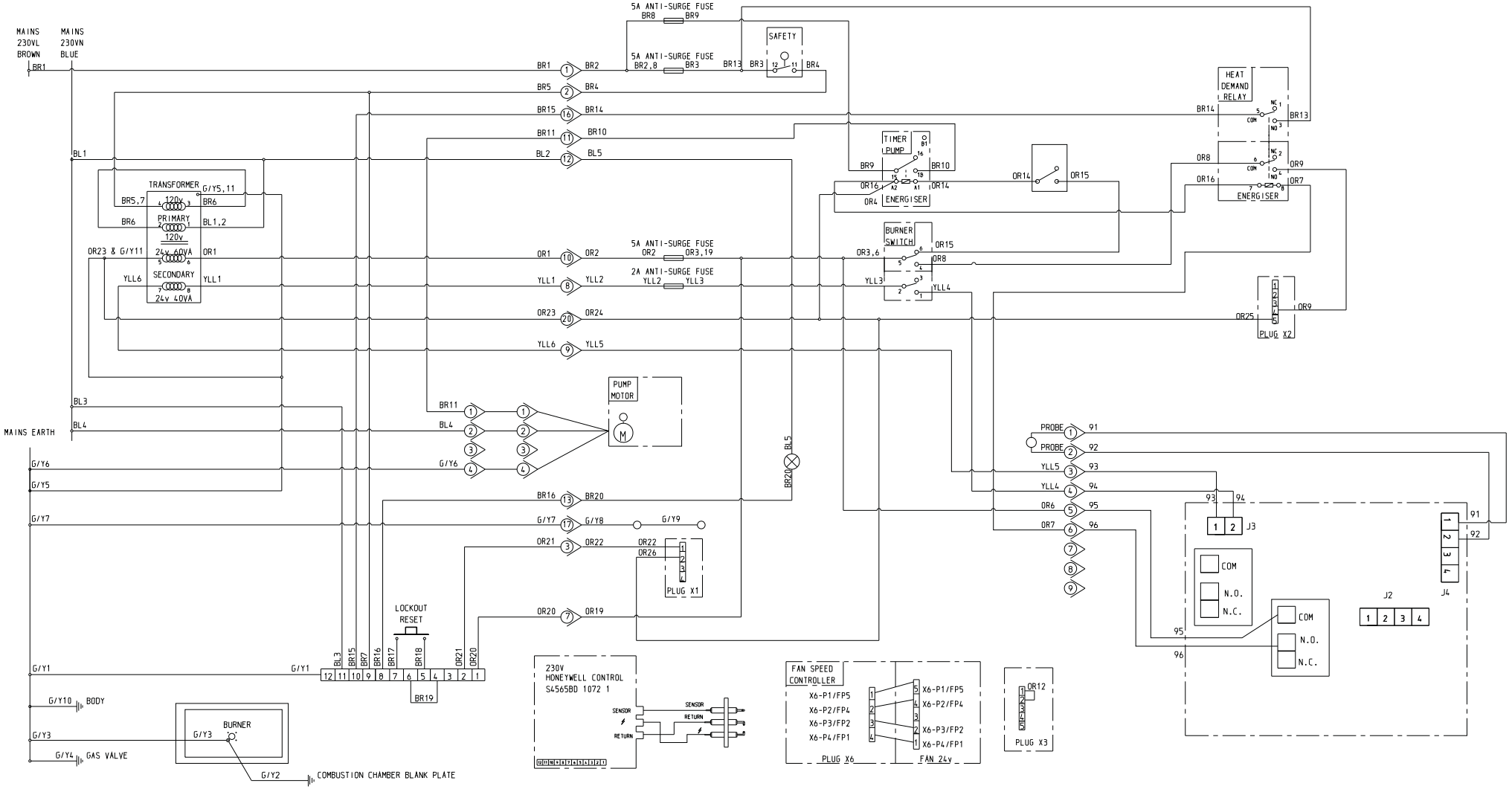
Frying food involves many variables and the following information is a guide only.

1. Ensure frying medium is clean and free of debris.
2. When topping up with oil, ensure oil level does not exceed “C” line when cold and “H” line when hot.
3. Never overfill baskets with food product.
4. Filter oil as often as is practically possible. Remember, this can be done whilst oil is below 180°C.
5. It is advised that a skimmer is used continuously between frying batches to remove any floating debris. Failure to do this can result in the oil becoming bitter to taste.
6. During quiet spells, it is recommended that thermostat is turned down to a lower setting. This will conserve energy in addition to extending expected oil life.
7. To ensure a good eating experience, fry food as near to serving time as possible.
8. After serving and when fryer has been turned off, replace lid to ensure that no foreign bodies can contaminate frying medium.

SECTION 11 - CIRCUIT DIAGRAM for G2844/G2844F

G2844 ONLY!

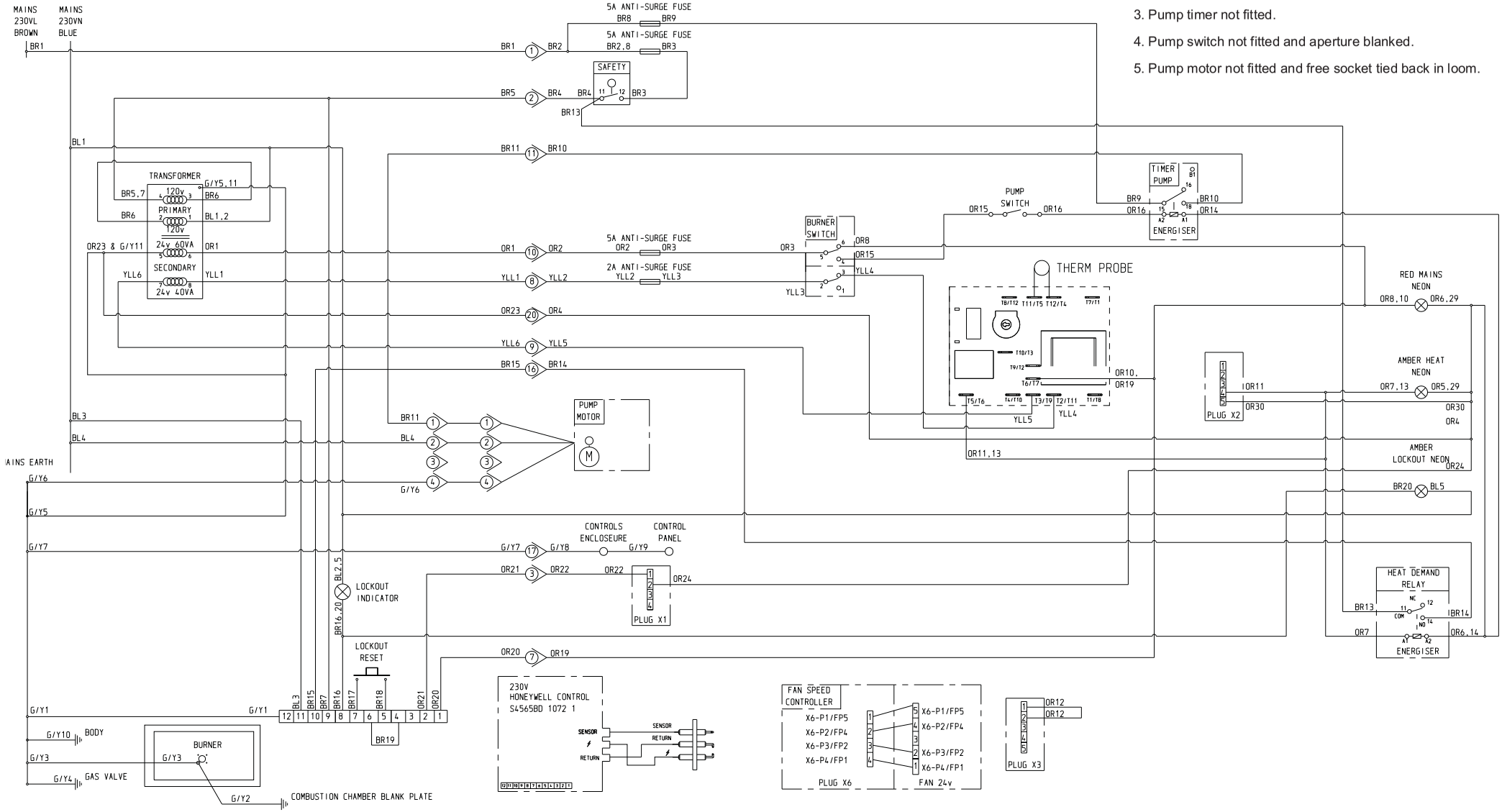
1. BR8, BR9, OR14 and OR15 **NOT** fitted.
2. BR10 to be tied back in loom.
3. OR4 and OR16 tails normally crimped together by means of an insulated nipple clamp.
4. Pump timer not fitted.
5. Pump switch not fitted and aperture blanked.
6. Pump motor not fitted and free socket tied back in loom.



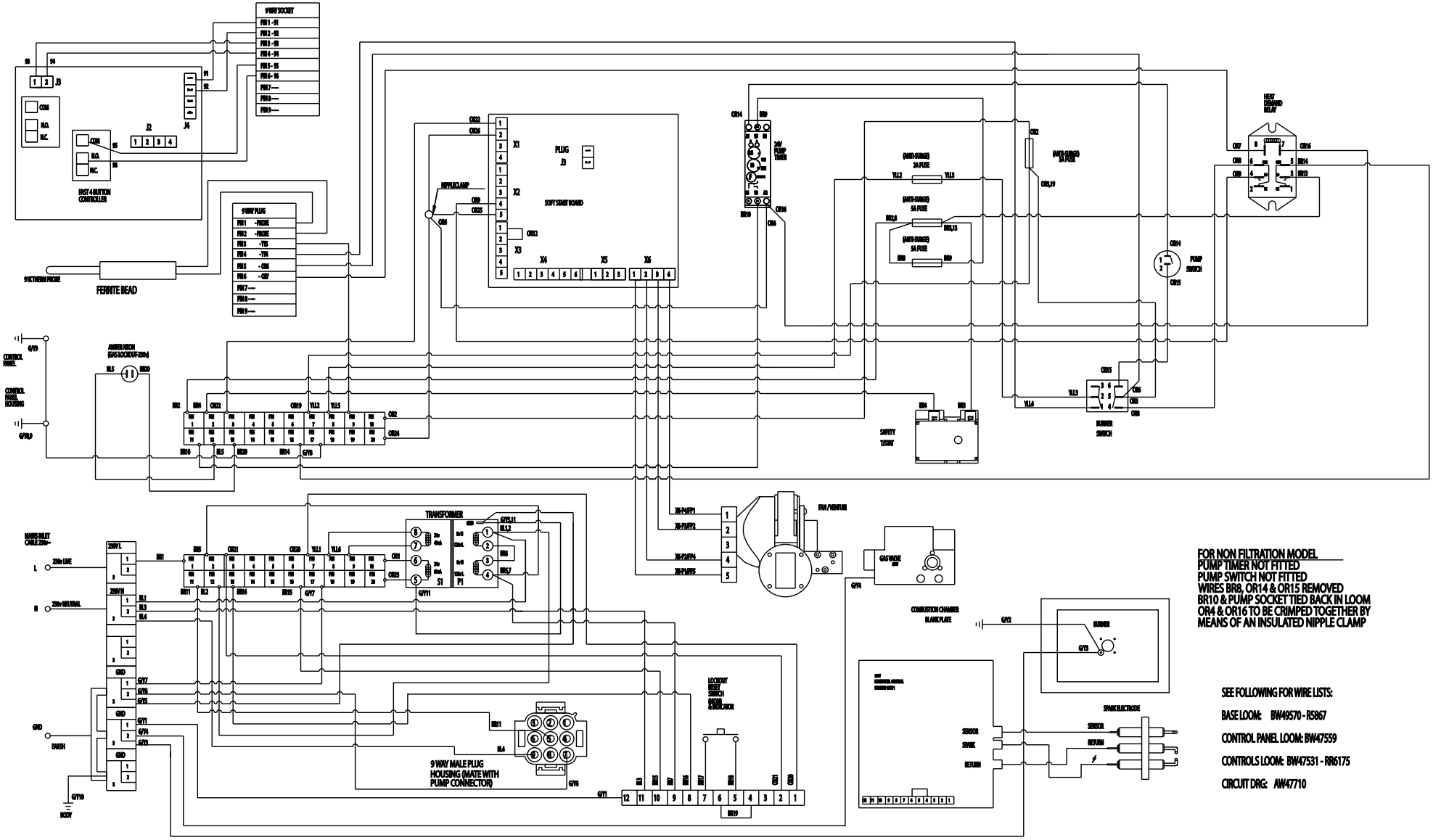
CIRCUIT DIAGRAM for G2845/G2845F

G2845 ONLY!

1. BR8, BR9, OR14, OR15 and OR16 **NOT** fitted.
2. BR10 to be tied back in loom.
3. Pump timer not fitted.
4. Pump switch not fitted and aperture blanked.
5. Pump motor not fitted and free socket tied back in loom.



SECTION 11 - WIRING DIAGRAM for G2844/G2844F



FOR NON FILTRATION MODEL
PUMP TIMER NOT FITTED
PUMP SWITCH NOT FITTED
WIRES BR8, OR14 & OR15 REMOVED
BR10 & PUMP SOCKET TIED BACK IN LOOM
OR4 & OR16 TO BE CRIMPED TOGETHER BY MEANS OF AN INSULATED NIPPLE CLAMP

SEE FOLLOWING FOR WIRE LISTS:

BASE LOOM: BW49570 - RS967

CONTROL PANEL LOOM: BW47559

CONTROLS LOOM: BW47531 - RR6175

CIRCUIT DRG: AW47710